
A New Combination in Gabonese *Synsepalum* (Sapotaceae)

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ABSTRACT. *Gambeya nyangensis* is shown to have been based on a mixed collection. The name is lectotypified and the species, with an amended description, is transferred to *Synsepalum*.

Gambeya nyangensis Pellegrin was recognized in 1924 and illustrated four years later (Pellegrin, 1928), based on *Le Testu 1786*, a collection from the Tchibanga region of southwestern Gabon. Included in this gathering were flower-bearing branchlets as well as detached seeds. Pellegrin's assumption that these two elements represented one species appears to have misled him in his generic placement of the species. He commented that in its general habit and reticulate foliar nervation, *G. nyangensis* approached *G. africana* (G. Don) Pierre, but offered no other justification for his recognition of the new species in *Gambeya*. However, the fact that the seeds of both *G. africana* and *G. subnuda* (Baker) Pierre (type species of *Gambeya*) resemble those assumed to belong to his new taxon in having a linear hilum may also have influenced his decision. That some doubt about it existed in his mind is suggested by his statement that the flowers of *G. nyangensis* are very similar to those of *Chrysophyllum* sect. *Zeyherella*, in particular those of *C. longipedicellatum* De Wildeman.

Aubréville (1961) stated flatly that *G. nyangensis* is not really a *Gambeya*. Nevertheless, lacking the intact fruit, he felt it best to leave the species there, while echoing Pellegrin's thoughts on *Zeyherella* and adding *Pachystela* and *Ecclinusa* to the list of generic candidates. Aubréville correctly pointed out that the seed of *Le Testu 1786* precludes the use of either *Pachystela* or *Zeyherella*.

Recent collecting in central Gabon has yielded specimens that resolve this puzzle. In January 1983 researchers at the Station d'Études des Gorilles et Chimanzés in the Lopé Reserve found chimpanzee dung containing a Sapotaceae seed that did not correspond to any species illustrated by Aubréville (1961). Seeds of the same species were found sev-

eral times over the years, during November–January, in both chimpanzee and gorilla dung (White & Abernethy, 1997: 186), but it was not until November 1990 that a fruiting specimen was located and collected. It proved impossible to identify this specimen, and a number of trees were monitored for flowering activity. In June 1996 flowering material was collected that matches very well the flower-bearing branchlets of the type of *G. nyangensis*. Since the recently collected seeds have a much wider hilum than do those of the type (>15 mm vs. ca. 3 mm), it is now evident that the type collection is a mixture, and the name is lectotypified below in accordance with Articles 9.9 and 9.10 of the *Code* (Greuter et al., 1994).

In Aubréville's key to genera in the *Flore du Gabon*, the recent material would lead to *Afroseralisia*, but that genus is now recognized as a synonym of an inclusive *Synsepalum*, based on the convincing work of Pennington (1991). Other Gabonese genera similarly now included in *Synsepalum* are *Pachystela*, *Tulestea*, and *Vincentella*. The necessary combination in *Synsepalum* is made below, and an amended description of the species is presented.

Synsepalum nyangense (Pellegrin) McPherson & L. White, comb. nov. Basionym: *Gambeya nyangensis* Pellegrin, Bull. Mus. Hist. Nat. (Paris) 1924: 327. TYPE: Gabon. Mayombe bayaka, Tchibanga, 16 Sep. 1914, *Le Testu 1786* (lectotype, designated here, P flowering branchlets; isotype, MO).

Amended description: Tree 20–35 m, 40–80 cm DBH, sometimes with narrow buttresses 2–4 m high, trunk somewhat fluted, twisted, or irregular. Bark orange-brown or orange-gray, flaky. Exudate white. Leaves mostly clustered at ends of branchlets, these appressed-pubescent but quickly glabrate, 5–8 mm diam.; blades obovate or oblong, (11–)15–25(–31) cm long, (3.7–)5.5–10(–13) cm wide, base attenuate and smoothly merging with the

petiole, apex rounded but with a short (to 5 mm), obtuse acumen in undamaged leaves, midrib prominent abaxially, much less so adaxially, lateral veins (9–)10–12 on each side of the midrib, the finer venation subparallel and visible on both surfaces, these at first appressed-pubescent but quickly glabrate; petiole (1.5–)2–4.5 cm long, glabrate; stipules absent. Flowers in fascicles in the axils of fallen leaves; pedicels 4–5 mm, accrescent in fruit to 10–15 mm long, pubescent; calyx of 5 (rarely 6) sepals, 3 mm long, 2 mm wide, fused one-third to one-half of length, fawn, pubescent abaxially and adaxially; corolla of 5 (rarely 6) petals, glabrous, corolla tube 1 mm long, corolla lobes 1.5–3 mm long, imbricate in bud, green; stamens 5, inserted on the throat of the corolla tube, filaments ca. 1 mm long, usually kinked centrally, anthers apiculate, ca. 1 mm long; staminodes absent; ovary 5-locular, pubescent with pale brown hairs, style glabrous. Fruits 4–5.7 cm long (on drying), 2.5–3 cm diam., yellow-orange or yellow, flesh translucent white, sweet; seed 3.4–4.7 cm long including 2–3 mm apiculum, ca. 2 cm wide, ca. 1.5 cm thick, somewhat laterally compressed, hilum occupying ca. two-thirds of the seed surface, its surface shallowly reticulate, testa smoother but not shiny, embryo with plano-convex cotyledons, endosperm absent.

Flowering is in June–July, and fruits ripen from November to January. Immature seeds are eaten by black colobus, *Colobus satanas*. Ripe fruits are consumed in large quantities by gorillas (*Gorilla g. gorilla*) and chimpanzees (*Pan t. troglodytes*), both of which swallow seeds intact and disperse them in their dung, and by smaller primates that may transport seeds short distances from the parent tree.

The trees occur in patches in mature forest, often along ridge lines at ca. 500–700 m throughout the Lopé Reserve, reaching densities of 3–5 adult trees per hectare on Mount Yindo, at 00°13'S, 11°34'E, where they are particularly common.

Specimens studied. GABON. **Nyanga:** Mayombe bayaka, Tchibanga, 16 Sep. 1914, *Le Testu 1786* (MO, P). **Ogooué-Ivindo:** Lopé-Okanda Reserve, hill SW of SEGC, ca. 200 m, 15 Nov. 1993, *McPherson 16189* (LBV, MO); Lopé Reserve, West Woods Transect, open forest, 25 Nov. 1990, *L. White 0228* (MO); Lopé Reserve, Camel Ridge, Nov. 1993, *L. White 1172* (MO); Lopé Reserve, Camel Ridge, mature forest, 600 m, 17 Nov. 1995, *L. White 1527, 1528, 1529* (all MO); Lopé Reserve, Camel Ridge, mature forest, 700 m, 25 June 1996, *L. White 1597* (MO).

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